



UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE
United States Patent and Trademark Office
Address: COMMISSIONER FOR PATENTS
P.O. Box 1450
Alexandria, Virginia 22313-1450
www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/665,450	09/22/2003	Hironori Harada	116897	7270
25944	7590	03/03/2006		
OLIFF & BERRIDGE, PLC P.O. BOX 19928 ALEXANDRIA, VA 22320			EXAMINER FERGUSON, MARISSA L	
			ART UNIT 2854	PAPER NUMBER

DATE MAILED: 03/03/2006

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary

Application No.

10/665,450

Applicant(s)

HARADA ET AL.

Examiner

Marissa L. Ferguson-Samreth

Art Unit

2854

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 21 December 2005.
- 2a) ☒ This action is **FINAL**. 2b) ☐ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-34 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☒ Claim(s) 21-34 is/are allowed.
- 6) ☒ Claim(s) 1-8 is/are rejected.
- 7) ☒ Claim(s) 9-20 is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☒ The drawing(s) filed on 24 September 2004 is/are: a) ☒ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☒ All b) ☐ Some * c) ☐ None of:
1. ☒ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. _____.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- 1) ☐ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☐ Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)
Paper No(s)/Mail Date _____.
- 4) ☐ Interview Summary (PTO-413)
Paper No(s)/Mail Date. _____.
- 5) ☐ Notice of Informal Patent Application (PTO-152)
- 6) ☐ Other: _____.

DETAILED ACTION

Claim Rejections - 35 USC § 102

1. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

Claims 1-8 are rejected under 35 U.S.C. 102(b) as being anticipated by Armstrong et al. (EPO 0,344,901).

Regarding claim 1, Armstrong et al. teaches a ribbon supply spool (66), a ribbon take up spool (10) that takes up an ink ribbon from said ribbon supply spool by rotating in a first rotation direction, said ribbon take up spool being provided with an engaging portion (60), an engaging member (80,130,222,230) that resiliently engages with said engaging portion to prevent said ribbon take up spool from rotating in a second rotation direction opposite to said first rotation direction, said engaging member coming off from said engaging portion when said ribbon take up spool rotates in said first direction (Abstract) and wherein said engaging portion (60,200) includes a first and second walls (refer to figure below) said take-up spool being prevented from rotating in said second direction as said engaging member engages with the first wall and said take-up spool being allowed to rotate in said first direction as said engaging member slips on the second wall (Abstract).



Regarding claim 2, Armstrong et al. teaches wherein said engaging portion (60,200) includes first and second walls arranged in said second rotation direction in this order, said engaging member (80,130,222,230) engaging with said engaging portion (60,200) by dropping into a space defined between said first and second walls (Figure 3), said first wall being defined along a plane including a rotation axis of said ribbon take up spool.

Regarding claim 3, Armstrong et al. teaches wherein said second wall is formed so as to allow said engaging member (80,130,222,230) to come off from said engaging portion (60,200) by sliding (elements 80 and 222 have a slanted tip which in turn causes the sliding movement) along said second wall when said ribbon take up spool is rotated in said first rotation direction.

Regarding claim 4, Armstrong et al. teaches wherein said second wall is inclined to face outside said ribbon take up spool (Figures 1 and 3).

Regarding claim 5, Armstrong et al teaches wherein said ribbon take up spool has substantially a cylindrical wall (38) and wherein said engaging portion is a slit (60,200) formed through said cylindrical wall.

Regarding claim 6, Armstrong et al. teaches wherein said cylindrical wall is provided with a plurality of said slits (60,200) arranged in a circumferential direction of said cylindrical wall.

Regarding claim 7, Armstrong et al. teaches wherein said ribbon take up spool is provided with a pair of brims (12,14) , said ink ribbon being wound around said ribbon take up spool at a space defined between said pair of brims and wherein said engaging portion is located outside said pair of brims (Figure 2).

Regarding claim 8, Armstrong et al. teaches a cassette case (62) that accommodates said ribbon supply spool and said ribbon take up spool, said engaging member being held by said cassette case and thereby prevented from rotating together with said ribbon take up spool (Figure 3).

Allowable Subject Matter

2. Claims 9-20 are objected to as being dependent upon a rejected base claim, but would be allowable if rewritten in independent form including all of the limitations of the base claim and any intervening claims.
3. Claims 21-34 are allowed.

Reasons for Allowance

4. The following is an examiner's statement of reasons for allowance: Regarding claims 9 and 23, the prior art does not teach or render obvious a linear portion formed at one end of a wire rod and a bent portion defined between an arc portion and a linear portion so as to allow a linear portion to extend in a substantially radial direction of a ribbon take up spool.

Regarding claim 21, the prior art does not teach or render obvious a second wall formed so as to allow the engaging member to come off from the engaging portion by sliding along a second wall when a ribbon take up spool is rotated in a first rotation direction and a second wall that is inclined to face outside a ribbon take up spool.

Regarding claim 22, the prior art does not teach or render obvious a ribbon take-up spool wherein an engaging portion is a slit formed through a cylindrical wall and wherein a cylindrical wall is provided with a plurality of slits arranged in a circumferential direction of a cylindrical wall.

Response to Arguments

5. Applicant's arguments regarding claims 1-8, filed 12/21/05 have been fully considered but they are not persuasive. Regarding the arguments on pages 2 and 3, the applicant refers to the second wall member as element 38 and the take-up spool as element 60. However, the examiner refers to the wall members as the elements as pointed out in figure 1 (please refer to figure on page ³~~2~~ of the detailed action) and the take-up spool as element 10. The notches 60 are formed in spool element 38 and as the spool rotates the engaging members (80,130,222,230) slip on the wall members.

AHH
2/28/06

Also, as indicated in the previous arguments, the engaging will also lock in notch 60 if the spool is in the proper locking location and will unlock if the notch 60 is not properly aligned. The unlocking causes the spool to slip on the second wall as indicated in the figure 1 as located on page 2 of this action and will allow the spool to rotate (Abstract, Column 1, Lines 16-34, Column 2, Lines 55-58 and Column 3, Lines 1-30).

Conclusion

THIS ACTION IS MADE FINAL. Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire **THREE MONTHS** from the mailing date of this action. In the event a first reply is filed within **TWO MONTHS** of the mailing date of this final action and the advisory action is not mailed until after the end of the **THREE-MONTH** shortened statutory period, then the

Art Unit: 2854

shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the mailing date of this final action.

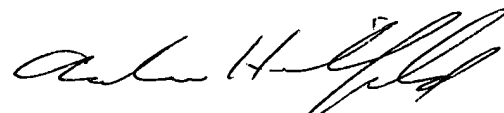
Any inquiry concerning this communication or earlier communications from the examiner should be directed to Marissa L. Ferguson-Samreth whose telephone number is (571) 272-2163. The examiner can normally be reached on (M-T) 6:30am-4:00pm and every other(F) 7:30am-4:00.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Andrew Hirshfeld can be reached on (571) 272-2168. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

Marissa L Ferguson-Samreth
Examiner
Art Unit 2854

MFS
February 23, 2006



ANDREW H. HIRSHFELD
SUPERVISORY PATENT EXAMINER
TECHNOLOGY CENTER 2800